Short Communication

Spiritual Interventions for Binge Eating Disorder

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**Abstract:** Binge eating (eating objectively large amounts of food with subjective loss of control) is a transdiagnostic feature of eating disorders [1] that is commonly reported among individuals with overweight or obesity and in individuals with- and without eating or weight disorders [30-39]. When binge eating occurs ≧1/wk for ≧3 months, it meets diagnostic criteria fro binge eating disorder. Binge eating disorder is associated with low remission rates, high relapse rates, treatment dissatisfaction, and high rates of failure to receive treatment attributed to stigma, misconceptions, lack of diagnosis, access to care, and inadequate insurance coverage. New interventions are needed that can overcome these barriers. Spiritual interventions [DESCRIPTION HERE ON WHAT SPIRITUAL INTERVENTIONS ARE, AND WHY THEY MIGHT BE USEFUL FOR BE/BED]. This commentary reviews existing research findings on the effectiveness of spiritual interventions for binge eating disorder and for substance-related and addictive disorders, which share some overlap with BED. Overall, spiritual interventions provide a promising complement to binge eating disorder treatment. However,, the role of spiritual interventions in binge eating disorder treatment is unclear and more high-quality research, including randomized controlled trials, should be conducted.

**Keywords:** Eating Disorder; Binge Eating Disorder; Overeaters Anonymous; Twelve-Steps; Spirituality; Food Addiction.

1. Binge Eating and the Need for New Treatment Options

Binge eating disorder (BED) is an autonomous DSM-V diagnosis characterized by episodes of rapidly consuming objectively large amounts of food due to loss of control while associated with distress, guilt, and shame, and occurring at least once per week for at least three months {APA, 2022 #10706}. The disorder is associated with high lifetime prevalence rates. For example, a national survey conducted in 2001–2003 found that 3% of American adults (n=260/9,282) experienced BED in their lifetime and 5-9.5% experienced binge eating behavior (including BED, subthreshold BED and binge eating in bulimia nervosa) {Hudson, 2007 #4907}. By contrast, a survey conducted in 397 Arabic medical students in 2022-2023 using the Eating attitude test-26 (EAT-26) identified 32.1% of survey respondents were at risk for an eating disorder, with 55.7% of respondents reporting regularly using food as a means of comfort during the pandemic and 51.1% reporting increased obsession with their weight or body image as a result of the pandemic {Almahmeed, 2025 #10743}.

an Nationally representative survey conducted in 511 and 2020 {Termorshuizen, 2020 #6859} have respectively found that 5–31% {Termorshuizen, 2020 #6859} of U.S and global populations experienced BED at some point in their lifetime and these numbers seem to be increasing exponentially over time){Hudson, 2007 #4907;Termorshuizen, 2020 #6859}. It is also associated with a complicated and costly health sequelae (e.g., anxiety, depression, obesity, cardiovascular disease, diabetes, and low self-esteem) that significantly impairs quality of life [2, 4-8]. Standard of care interventions for BED include psychological interventions (e.g., cognitive behavioral therapy (CBT), CBT-self-help, interpersonal therapy, and psychodynamic therapies), medications (antidepressants, anticonvulsants, and anti-obesity/weight loss medications), nutritional counseling, and behavioral weight loss [9]. A variety of additional evidence-based practices are gaining traction in the context of BED, including family-based therapy (FBT) and other psychodynamic therapies with guideline support [9, 10] as well as humanistic therapy [10], dialectical behavioral therapy (DBT), and DBT guided self-help [11, 12]. All of these interventions have low treatment success rates (38.3–43.6% [2, 4]), high recurrence rates (49–64% [2, 13]), high treatment dissatisfaction [14], and early discontinuation of care [14]. Moreover, studies find that 93.4–96.8% of individuals who meet DSM criteria for BED never receive a formal diagnosis [15, 16], 67.3% do not perceive the need for formal treatment [15], and 56.4–86.8% never receive or pursue standard treatment [2, 15] due to a variety of possible reasons.

Binge *eating* (eating objectively large amounts of food with subjective loss of control) is a transdiagnostic feature of BED and other eating disorders {APA, 2022 #10706}. Binge eating is commonly reported among individuals with overweight and obesity {APA, 2022 #10706;Bray, 2023 #7854;Camacho-Barcia, 2024 #10735;Jebeile, 2024 #10715;Pasquale, 2024 #10720;Goens, 2023 #10730;Roberts, 2023 #10712;Goens, 2023 #10730;Carbone, 2023 #10714;Baboumian, 2023 #10711;Aguiar, 2023 #10717;Sutton, 2022 #10736;House, 2022 #10738;di Giacomo, 2022 #10725;Breton, 2022 #10739;Tabone, 2022 #10718;Sutton, 2022 #10736;House, 2022 #10738;di Giacomo, 2022 #10725;Breton, 2022 #10739;Agüera, 2021 #10726;Cuthbert, 2020 #10733;Byrne, 2019 #10737;McCuen-Wurst, 2018 #10724;da Luz, 2018 #10728;Pont, 2017 #10732;He, 2017 #10731;Brownley, 2016 #10727;Val-Laillet, 2015 #10729;Naef, 2015 #10734;de Zwaan, 2001 #10740;Striegel-Moore, 1998 #6877;Stunkard, 1994 #10710} and in individuals without eating or weight disorders {Pasquale, 2024 #10720}{Roberts, 2023 #10712;Goens, 2023 #10730;Carbone, 2023 #10714}{Tabone, 2022 #10718}{Sutton, 2022 #10736}{di Giacomo, 2022 #10725}{Breton, 2022 #10739;APA, 2022 #10706;Agüera, 2021 #10726;Spettigue, 2020 #10716;Phillipou, 2020 #6872;Simone, 2021 #6859;Duncan, 2017 #10741;Mustelin, 2017 #6904;, 2021 #6589;Levallius, 2020 #6893;Kelly, 2018 #6900;He, 2017 #10731;Brownley, 2016 #10727;Mitchison, 2015 #6903;Kelly-Weeder, 2014 #10713;Mitchison, 2013 #6899;Wade, 2012 #6906}.

For example, studies conducted in 2012-2013 report that 36.2% – 87.8% of individuals with binge eating disorder and 32.8%–33.2% of individuals with bulimia nervosa (BN) will experience obesity at some point in their lifetime {Villarejo, 2012 #10742}{Kessler, 2013 #4908}.

Conversely, the Collaborative Psychiatric Epidemiology Surveys (CEPES), which consist of three large-scale US population-representative samples with a cumulative total of 12,337 adult respondents, reported elevated lifetime prevalence rates of BED and bulimia nervosa (BN) among adults with obesity (with BED and BN prevalence at 8.19% in women and 8.5% in men) {Duncan, 2017 #10741}.

In 2012-2013, binge eating was estimated to have a 4.5% lifetime prevalence in the U.S. {Cossrow, 2016 #5017}. However, numerous studies suggest binge eating{Phillipou, 2020 #6872;Simone, 2021 #6859;Termorshuizen, 2020 #6870;Monteleone, 2021 #6860;Giel, 2021 #6853;Giel, 2021 #6846} and associated psychopathological dimensions{Monteleone, 2021 #6860} increased during the Coronavirus disease 2019 (COVID-19) lockdown, and remained increased after reopening {Phillipou, 2020 #6872;Simone, 2021 #6859;Termorshuizen, 2020 #6870;Monteleone, 2021 #6860;Giel, 2021 #6853;Giel, 2021 #6846}.

Binge eating is a core feature of eating disorders such as bulimia nervosa (when accompanied by purging behaviors: vomiting or laxative use) and binge eating disorder (when binge eating occurs ≧1/wk for ≧3 months in the absence of purging behaviors). Cognitive behavioral therapy is the current standard treatment for binge eating disorder[44], but has mixed outcomes[45] and is associated with low remission rates (52–62%)[46] and 20–60% relapse rates[45] pre-pandemic. Pharmacotherapeutic interventions have mixed results and guidelines but do not improve cognitive behavioral therapy’s success[44,45]. Moreover, national survey data collected pre-pandemic in 2001 – 2003 demonstrate that 56.4% of individuals with binge eating disorder never receive or pursue treatment for their illness[47] due to stigma, misconceptions, lack of education, diagnosis, access to care, and inadequate insurance coverage[47-49]. Binge eating disorder has also been associated with treatment dissatisfaction and early discontinuation of care (pre-pandemic)[49]. Therefore, there is a need for research identifying new interventions that can overcome treatment barriers and limitations for binge eating and binge eating disorder.

1. Research on Spiritual Interventions

Research findings suggest that spirituality can have a protective effect on recovery from binge eating disorder[50]. Findings also support a protective role for spirituality in recovery from substance-related and addiction disorders[51,52], which have high comorbidity rates with binge eating disorder[53] and often share similar neurobiological underpinnings[54-56]. The remainder of this subsection will highlight information and research findings on spirituality as it pertains to: 1) the DSM-V; 2) binge eating disorder; and 3) substance-related and addictive disorders.

* + 1. Spirituality in the DSM-V

In 2006, the Corresponding Committee on Religion, Spirituality, and Psychiatry of the American Psychiatric Association (APA) recognized spirituality as an important possible aspect of several major DSM-V diagnostic categories that have high comorbidity with binge eating disorder[53,57-59]. These categories included substance-related and addictive disorders, depression, anxiety and adjustment disorders, and posttraumatic stress disorders[57]. Subsequently, the APA published an authoritative text on religious and spiritual issues in psychiatric diagnosis that provided a research agenda for the DSM-V[60]. The text endorsed the potentially therapeutic role for spiritual experiences and interventions[61], and suggested changes be made to the DSM-V to: 1) encourage clinicians to “carefully explore the spiritual context from which …symptoms emerge [and their] meaning to the patient,” (Blazer, 2011, p. 17 as cited in Chandler, 2012) for specific disorders such as depression[57,62]; and 2) incorporate patients’ spiritual/religious concerns regarding meaning, loss, isolation, autonomy, and guilt into the DSM-V’s introduction[57,60].

* + 1. Spirituality in Eating Disorder Recovery

There are 24 studies on spirituality and eating disorders published between 2021 – 2001 add here[63-86].

A randomized pretest-posttest-controlled clinical study conducted in 1999 – 2001 in 122 adolescent and adult women receiving inpatient treatment for 68 days (mean) for bulimia nervosa (n = 47), anorexia nervosa (n = 42), or eating disorder not otherwise specified (ED-NOS, n = 33) randomly assigned participants to receive a spiritual support group intervention (reading and 1hr weekly group meetings to discuss a non-denominational spiritual self-help workbook, n = 43) or a cognitive behavioral therapy intervention (CBT, reading and 1hr weekly group meetings to discuss a CBT self-help workbook, n = 35) or an emotional intervention (1hr weekly group meetings with open discussion, n = 44)[87]. The study found participants receiving the spiritual intervention had significantly greater reductions in Eating Attitudes Test (EAT) scores relative to the cognitive behavioral therapy group (F2,111 = 4.56, p = 0.013, Cohens d = 0.68). Participants receiving the spiritual intervention also had significantly greater reductions in Outcome Questionnaire (OQ-45) symptom distress (OQ-45-SD) and relationship distress (OQ-45-RD) scores relative to the CBT and emotional intervention groups (OQ-45-SD: F2,113 = 3.78, p = 0.26, d vs. CBT = 0.53, d vs. emotional = 0.54; OQ-45-RD: F2,113 = 5.37, p = 0.006, d vs. CBT = 0.59, d vs. emotional = 0.67). The inpatient treatment program was noted to be grounded in contemporary research findings and accepted clinical guidelines for treating eating disorders (APA, 2000). Its interdisciplinary approach included “a twelve-step group patterned after AA but adapted for women with eating disorders[87],” suggesting that all participants may have experienced some spiritual engagement outside of the three interventions of interest.

Spirituality is also an important aspect of twelve-step programs like overeaters anonymous. Overeaters Anonymous is [\*\*\*DESCRIPTION HERE\*\*\*]. Although OA is not religious, it does have spiritual components. For example, the basic text of AA (OA’s predecessor) suggests that recovery requires “the maintenance and growth[88]” of a “necessary vital spiritual experience[89].” Furthermore, AA/OA’s 11th Step suggests the use of prayer and meditation to achieve spiritual awareness and growth[90-93]. A 2002 PhD dissertation study conducted in 229 active OA members who self-identify as binge eaters (n = 194) or bulimics (n = 35) found increased prayer and meditation to correlate positively with the ratio of length of abstinence/time in OA (r = 0.2, p < 0.01) and inversely with relapse/”slip” frequency (r = 0.16, p < 0.05) [50]. These findings will need to be verified by higher-quality, peer-reviewed clinical trials.

1. A Note on Meditation

Meditation is an important aspect of twelve-step programs like OA. In these programs, meditation can represent a form of prayer and/or spiritual connection. Although meditation originated through the context of spirituality[94], not all meditation includes prayer or spiritual components. AA and OA literature describe meditation (and prayer) as principal means for establishing and improving spiritual awareness[90] and conscious contact with “God,” according to one’s own personal understanding of god[90,93]. The descriptions of meditation provided in twelve-step literature and resources imply that meditation is suggested to be used as “a quite time set aside for stilling our minds – so we have a chance to hear our Higher Power’s direction[95].” Thus, although the purpose of meditation in twelve-step programs is intently spiritual, the act of meditation itself may be as simple as a non-spiritual period of “quieting the mind.” Twelve-step literature does not provide instruction on any particular type of meditation that should be practiced (e.g., spiritual meditation, mindful meditation, etc.). Therefore, the remainder of this section will summarize neurobiological findings on all forms of meditation as they pertain to binge eating disorder.

Although meditation originated through the context of spirituality[94], not all meditation includes prayer or spiritual components. Various forms of meditation exist, which can be spiritual/religious (e.g., Buddhist jhāna meditation)[96] and secular (e.g., mindfulness meditation)[97]). Secular meditation such as mindfulness interventions have produced promising results for binge eating disorder treatment[98-107], but are outside the scope of this commentary, as they are not spiritual. To our knowledge, no studies exist outside of Kriz’ 2002 dissertation on the effectiveness of various aspects of OA[50] that investigate the efficacy of spiritual meditation in supporting binge eating disorder treatment.

1. Research on Religiosity and Eating Disorders

Sentence on how religiosity differs from – and is similar to – spirituality.

There are 13 studies on religiosity and EDs (2021 – 2000) here[63,67,71,72,76,79,80,82,85,86,108-110].

1. Overall Conclusions

Spiritual Interventions provide a promising complement for treating binge eating disorder. SUMMARY HERE.

**Supplementary Materials:** The following are available online at www.mdpi.com/xxx/s1, Table S1: Variety in Groups and Formats of Overeaters Anonymous.

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